



Tierra Solutions, Inc. via US Mail and Electronic Mail

January 24, 2017

Mr. Jeffrey Thein  
New Jersey Department of Environmental Protection  
Division of Water Quality Bureau of Point Source Permitting – Region One  
P.O. Box 029  
Trenton, New Jersey 08625-0029

Re: Discharge Monitoring Report for December 2016  
Diamond Alkali Superfund Site  
Newark, New Jersey

Dear Mr. Thein:

In accordance with the New Jersey Pollutant Discharge Elimination System (NJPDES) Discharge to Surface Water (DSW) Permit Equivalent, dated May 2, 2000, for the Diamond Alkali Superfund Site in Newark, New Jersey, Tierra Solutions, Inc. (Tierra, formerly Chemical Land Holdings, Inc.) has prepared the Discharge Monitoring Report (DMR) for the month of December 2016 (Attachment 1). Tierra is currently extracting and treating groundwater in the on-site water treatment system and directly discharging effluent to the Passaic River.

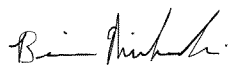
The effluent is sampled once per month and analyzed for the chemical constituents listed in the NJPDES DSW Permit Equivalent. The analytical results for each sample are validated and the constituent concentrations are compared against the concentration limits established in the NJPDES DSW Permit Equivalent. The analytical results are representative of the effluent discharged throughout the month.

In December 2016, 74,716 gallons of groundwater were treated and discharged to the Passaic River. The direct discharge of treated effluent was limited to periods of high tide when the adjacent mud flats were not exposed. A flow meter was used to record the volume of treated effluent discharged to the river.

A summary of the analytical results for the December 2016 treated effluent and the corresponding monthly average and daily maximum permit limit concentration for each chemical constituent is included in Attachment 2.

If you should have any questions related to the DMR, please call me at (732) 579-7586.

Sincerely,



Brian Mikucki  
On behalf of Occidental Chemical Corporation  
(as successor to Diamond Shamrock Chemicals Company )

Enclosures

Cc: Ms. Elizabeth Butler  
New Jersey Superfund Branch – 2  
Emergency and Remedial Response Division  
U.S. Environmental Protection Agency, Region II  
290 Broadway, 20th Floor  
New York, New York 10007-1866

Mr. Jay Nickerson  
Bureau of Case Management, Site Remediation Program  
Mail Code 401-05F  
P.O. Box 420  
Trenton, New Jersey 08625-0420

Glenn Springs Holdings, Inc.  
5 Greenway Plaza, Suite 110  
Houston, TX 77046  
Attention: Juan Somoano

# ATTACHment 1

PERMITTEE NAME/ADDRESS (Include Facility Name/Location if Different)

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES)

## DISCHARGE MONITORING REPORT (DMR)

Form Approved  
OMB No. 2040-0004NAME Tierra Solutions, Inc. (formerly  
Chemical Land Holdings, Inc.)NJPDES DSW Permit Equivalent –  
May 2000

----

ADDRESS Two Tower Center Boulevard  
10<sup>th</sup> Floor

PERMIT NUMBER

DISCHARGE NUMBER

East Brunswick, NJ 08816

FACILITY Diamond Alkali Superfund Site

LOCATION Newark, Essex County, NJ

FROM

## MONITORING PERIOD

YEAR	MO	DAY	TO	YEAR	MO	DAY
2016	12	01		2016	12	31

☐ Check here if no Discharge.Note: Read Instructions before  
completing this form.

PARAMETER		QUANTITY OR LOADING			QUALITY OR CONCENTRATION				NO. EX	FREQUENCY OF ANALYSIS	SAMPLE TYPE
		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNITS			
Flow	SAMPLE	74,716	7,718	GPD	----	----	----	----	0	1/30	Flow Meter
	PERMIT REQUIREMENT	NL <sup>1</sup>	NL		----	----	----		0	1/30	Flow Meter
Total Suspended Solids	SAMPLE	----	----	----	N/A	3.0 U	3.0 U	mg/l	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		N/A	30	50		0	1/30	Grab
Total Organic Carbon	SAMPLE	----	----	----	N/A	1.4	1.4	mg/l	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		N/A	NL	40		0	1/30	Grab
Petroleum Hydrocarbons	SAMPLE	----	----	----	N/A	5.0 UJL	5.0 UJL	mg/l	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		N/A	10	15		0	1/30	Grab
pH	SAMPLE	----	----	----	7.16	NA	8.06	SU	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		6	NL	9		0	1/30	Grab
2,4,6-Trichlorophenol	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		N/A	115	260		0	1/30	Grab
2-Chlorophenol	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab
	PERMIT REQUIREMENT	----	----		N/A	35	125		0	1/30	Grab
NAME/TITLE PRINCIPAL EXECUTIVE OFFICER		I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.				TELEPHONE		DATE			
Brian Mikucki Project Coordinator						(732) 579-7586		2017 01 24			
TYPED OR PRINTED						AREA		NUMBER		YEAR	

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here) 1) The flow quantity is actually the total flow discharged for the entire month. 2) NL – Not Limited. 3) N/A – Not Applicable.  
4) U – Constituent Analyzed, but Not Detected. 5) GPD – Gallons per Day. 6) lbs/day – pounds/day. 7) J – Detection limit is estimated.

EPA Form 3220-1 (Rev. 03-99) Previous editions may be used.

PAGE 1 OF 7

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NAME Tierra Solutions, Inc. (formerly  
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May 2000ADDRESS Two Tower Center Boulevard  
10<sup>th</sup> Floor

PERMIT NUMBER

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		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNITS						
2,4-Dichlorophenol	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	23	150		0	1/30	Grab			
Phenol	SAMPLE	----	----	----	N/A	23 U	23 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	23	40		0	1/30	Grab			
1,2,4-Trichlorobenzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	45	90		0	1/30	Grab			
Hexachlorobenzene	SAMPLE	5.5E-04	7.1E-04	lbs/d	N/A	22 U	22 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	NL	16.3	ay	N/A	22	40		0	1/30	Grab			
1,2-Dichlorobenzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	40	110		0	1/30	Grab			
1,3-Dichlorobenzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	25	35		0	1/30	Grab			
1,4-Dichlorobenzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	18	45		0	1/30	Grab			
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		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNITS							
Fluoranthene	SAMPLE	----	----	----	N/A	10 U	10 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	NL	16		0	1/30	Grab				
Naphthalene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	35	105		0	1/30	Grab				
Phenanthrene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	35	105		0	1/30	Grab				
Benzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	21	57		0	1/30	Grab				
Chlorobenzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	23	45		0	1/30	Grab				
1,2-Dichloroethane	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	30	85		0	1/30	Grab				
1,1,1-Trichloroethane	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab				
	PERMIT REQUIREMENT	----	----		N/A	25	65		0	1/30	Grab				
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Brian Mikucki Project Coordinator						(732) 579-7586		2017 01 24							
TYPED OR PRINTED						SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT		AREA	NUMBER	YEAR	MO	DAY			

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		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNITS						
1,1-Dichloroethane	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	25	65		0	1/30	Grab			
Chloroform	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	20	40		0	1/30	Grab			
Trans-1,2-Dichloroethene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	25	65		0	1/30	Grab			
Ethyl Benzene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	--	430		0	1/30	Grab			
Toluene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	18	35		0	1/30	Grab			
Trichloroethene	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	25	65		0	1/30	Grab			
Vinyl Chloride	SAMPLE	----	----	----	N/A	5.0 U	5.0 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	25	65		0	1/30	Grab			
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Brian Mikucki Project Coordinator						(732) 579-7586		2017	01	24				
TYPED OR PRINTED						SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT		AREA	NUMBER	YEAR	MO	DAY		

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## DISCHARGE MONITORING REPORT (DMR)

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		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNI TS								
4,4-DDT	SAMPLE	8.5E-06	1.1E-05	lbs/d	N/A	0.34 U	0.34 U	µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	NL	0.25	ay	N/A	NL	0.34		0	1/30	Grab					
4,4-DDE	SAMPLE	----	----	----	N/A	0.35 U	0.35 U	µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	----	----	----	N/A	NL	14		0	1/30	Grab					
Alpha-endosulfan	SAMPLE	----	----	----	N/A	0.050 U 0.050 U		µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	----	----	----	N/A	32	90		0	1/30	Grab					
2,4-D	SAMPLE	----	----	----	N/A	11 U	11 U	µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	----	----	----	N/A	1,500	3,300		0	1/30	Grab					
2,4-DB	SAMPLE	----	----	----	N/A	16 UJ	16 UJ	µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	----	----	----	N/A	17	25		0	1/30	Grab					
Dinoseb (DNBP)	SAMPLE	----	----	----	N/A	1.6 U	1.6 U	µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	----	----	----	N/A	420	790		0	1/30	Grab					
Dioxin (2,3,7,8-TCDD)	SAMPLE	2.0E-09	2.6E-09	lbs/d	N/A 0.000081 U 0.000081 U			µg/l	0	1/30	Grab					
	PERMIT REQUIREMENT	NL	0.00006	ay	N/A	NL	0.000081		0	1/30	Grab					
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Brian Mikucki							(732) 579-7586 2017 01 24									
Project Coordinator							AREA		NUMBER							
TYPED OR PRINTED		SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT					YEAR		MO							
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 4) U – Constituent Analyzed, but Not Detected. 5) GPD – Gallons per Day. 6) lbs/day – pounds/day. 7) J – Detection limit is estimated. 8) The 2,4-D result is based on the analysis of the field duplicate sample, as approved by the USEPA via email on 11/15/16, because the result from the parent sample was rejected based on MS/MSD recoveries.

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		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNI TS										
Total Recoverable Antimony	SAMPLE	----	----	----	N/A	60 U	60 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	200	305		0	1/30	Grab							
Total Recoverable Arsenic	SAMPLE	----	----	----	N/A	10 U	10 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	50	115		0	1/30	Grab							
Total Recoverable Beryllium	SAMPLE	----	----	----	N/A	8.6 U	8.6 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	NL	8.6		0	1/30	Grab							
Total Recoverable Cadmium	SAMPLE	----	----	----	N/A	31 U	31 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	NL	31		0	1/30	Grab							
Hexavalent Chromium	SAMPLE	----	----	----	N/A	44 U	44 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	NL	66		0	1/30	Grab							
Trivalent Chromium	SAMPLE	----	----	----	N/A	10 U	10 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	NL	44		0	1/30	Grab							
Total Recoverable Copper	SAMPLE	----	----	----	N/A	62 U	62 U	µg/l	0	1/30	Grab							
	PERMIT REQUIREMENT	----	----		N/A	NL	62		0	1/30	Grab							
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completing this form.

PARAMETER		QUANTITY OR LOADING			QUALITY OR CONCENTRATION				NO. EX	FREQUENCY OF ANALYSIS	SAMPLE TYPE			
		AVERAGE	MAXIMUM	UNITS	MINIMUM	AVERAGE	MAXIMUM	UNITS						
Total Recoverable Lead	SAMPLE	----	----	----	N/A	18 U	18 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	18		0	1/30	Grab			
Total Recoverable Mercury	SAMPLE	----	----	----	N/A	3.4 U	3.4 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	3.4		0	1/30	Grab			
Total Recoverable Nickel	SAMPLE	----	----	----	N/A	73 U	73 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	73		0	1/30	Grab			
Total Recoverable Silver	SAMPLE	----	----	----	N/A	69 U	69 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	69		0	1/30	Grab			
Total Recoverable Zinc	SAMPLE	----	----	----	N/A	47 U	47 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	47		0	1/30	Grab			
Total Cyanide	SAMPLE	----	----	----	N/A	78 U	78 U	µg/l	0	1/30	Grab			
	PERMIT REQUIREMENT	----	----	----	N/A	NL	78		0	1/30	Grab			
----	SAMPLE	----	----	----	N/A	----	----	----	----	----	----			
	PERMIT REQUIREMENT	----	----	----	N/A	----	----		----	----	----			
NAME/TITLE PRINCIPAL EXECUTIVE OFFICER		I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.				TELEPHONE		DATE						
Brian Mikucki						(732) 579-7586		2017 01 24						
Project Coordinator						AREA		NUMBER	YEAR	MO	DAY			
TYPED OR PRINTED		SIGNATURE OF PRINCIPAL EXECUTIVE OFFICER OR AUTHORIZED AGENT												

COMMENT AND EXPLANATION OF ANY VIOLATIONS (Reference all attachments here) 1) The flow quantity is actually the total flow discharged for the entire month. 2) NL – Not Limited. 3) N/A – Not Applicable.  
4) U – Constituent Analyzed, but Not Detected. 5) GPD – Gallons per Day. 6) lbs/day – pounds/day. 7) J – Detection limit is estimated.

# ATTACHMENT 2

**DECEMBER 2016 SUPPLEMENTAL TABLE FOR MONTHLY DISCHARGE MONITORING REPORT**  
**DIAMOND ALKALI SUPERFUND SITE**  
**NEWARK, NEW JERSEY**

Constituent	Permit Limitation		Sample ID:	W-TSI-EFF-120116	W-TSI-EFF-DUP-120116	TB-120116-708R
			Sample Date:	12/1/2016	12/1/2016	12/1/2016
			SDG Number :	LISTER708R	LISTER708R	LISTER708R
	Monthly Avg.	Daily Max	Units	Effluent	Effluent Duplicate	Trip Blank
Total Suspended Solids(TSS)	30	50	mg/l	3 U	3 U	-
Total Organic Carbon (TOC)	-	40	mg/l	1.3	1.4	-
Petroleum Hydrocarbons	10	15	mg/l	5.0 ULL	5.0 ULL	-
pH	-	6 - 9	SU	7	7.00	-
2,4,6-Trichlorophenol	115	260	µg/l	5 U	5 U	-
2-Chlorophenol	35	125	µg/l	5 U	5 U	-
2,4-Dichlorophenol	23	150	µg/l	5 U	5 U	-
Phenol	23	40	µg/l	23 U	23 U	-
1,2,4-Trichlorobenzene	45	90	µg/l	5.0 U	5.0 U	5.0 U
Hexachlorobenzene	22	40	µg/l	22 U	22 U	-
1,2-Dichlorobenzene	40	110	µg/l	5.0 U	5.0 U	5.0 U
1,3-Dichlorobenzene	25	35	µg/l	5.0 U	5.0 U	5.0 U
1,4-Dichlorobenzene	18	45	µg/l	5.0 U	5.0 U	5.0 U
Fluoranthene	-	16	µg/l	10 U	10 U	-
Naphthalene	35	105	µg/l	5 U	5 U	-
Phenanthrene	35	105	µg/l	5 U	5 U	-
Benzene	21	57	µg/l	5.0 U	5.0 U	5.0 U
Chlorobenzene	23	45	µg/l	5.0 U	5.0 U	5.0 U
1,2-Dichloroethane	30	85	µg/l	5.0 U	5.0 U	5.0 U
1,1,1-Trichloroethane	25	65	µg/l	5.0 U	5.0 U	5.0 U
1,1-Dichloroethane	25	65	µg/l	5.0 U	5.0 U	5.0 U
Chloroform	20	40	µg/l	5.0 U	5.0 U	5.0 U
1,2-Dichloroethene (Total)	25	65	µg/l	5 U	5 U	-
trans-1,2-Dichloroethene	25	65	µg/l	5.0 U	5.0 U	5.0 U
Ethylbenzene	-	430	µg/l	5.0 U	5.0 U	5.0 U
Toluene	18	35	µg/l	5.0 U	5.0 U	5.0 U
Trichloroethene	25	65	µg/l	5.0 U	5.0 U	5.0 U
Vinyl Chloride	25	65	µg/l	5.0 U	5.0 U	5.0 U
4,4-DDT	-	0.34	µg/l	0.34 U	0.34 U	-
4,4-DDE	-	14	µg/l	0.35 U	0.35 U	-
Endosulfan I	32	90	µg/l	0.05 U	0.05 U	-
2,4-D	1,500	3,300	µg/l	11 U	11 U	-
2,4-DB	17	25	µg/l	16 U	16 U	-
Dinoseb (DNBP)	420	790	µg/l	1.6 U	1.6 U	-
Dioxin (2,3,7,8-TCDD)	-	0.000081	µg/l	0.000081 U	0.000081 U	-
Total Recoverable Antimony	200	305	µg/l	60 U	60 U	-
Total Recoverable Arsenic	50	115	µg/l	10 U	10 U	-
Total Recoverable Beryllium	-	8.6	µg/l	8.6 U	8.6 U	-
Total Recoverable Cadmium	-	31	µg/l	31 U	31 U	-
Hexavalent Chromium	-	66	µg/l	44 U	44 U	-
Trivalent Chromium *	-	44	µg/l	10 U	10 U	-
Total Recoverable Copper	-	62	µg/l	62 U	62 U	-
Total Recoverable Lead	-	18	µg/l	18 U	18 U	-
Total Recoverable Mercury	-	3.4	µg/l	3.4 U	3.4 U	-
Total Recoverable Nickel	-	73	µg/l	73 U	73 U	-
Total Recoverable Silver	-	69	µg/l	69 U	69 U	-
Total Recoverable Zinc	-	47	µg/l	47 U	47 U	-
Total Cyanide	-	78	µg/l	78 U	78 U	-

Notes:

mg/l - Milligrams/liter

µg/l - Micrograms/liter

SU - Standard units

- - Not applicable

U - Constituent was not detected above the associated detection limit

U - The material was analyzed for, but was not detected. The sample quantitation limit is an estimated quantity.

ULL - The material was analyzed for, but was not detected. The sample quantitation limit is an estimated quantity. Low bias is indicated.

\* Trivalent Chromium Concentration is calculated based on the total and hexavalent chromium results.

**DECEMBER 2016 MONTHLY DISCHARGE ANALYTICAL DATA SUMMARY**  
**DIAMOND ALKALI SUPERFUND SITE**  
**NEWARK, NEW JERSEY**

Constituent	Permit Limitation		Sample ID: WTSI-EFF-120116	Monthly Average <sup>(1)</sup>	Daily Maximum
	Monthly Avg.	Daily Max	SDGN Number: LISTIER708R Units Effluent		
Flow	—	—	GPD	74,716	7,718
Total Suspended Solids(TSS)	30	50	mg/l 3 U	3 U	3 U
Total Organic Carbon (TOC)	—	40	mg/l 1.4	1.4	1.4
Petroleum Hydrocarbons	10	15	mg/l 5.0 ULL	5.0 ULL	5.0 ULL
Field pH Range (December, 2016)	—	6 - 9	SJ 6.99 - 8.06	NA	8.06
2,4,6-Trichlorophenol	115	260	µg/l 5.0 U	5.0 U	5.0 U
2-Chlorophenol	35	125	µg/l 5.0 U	5.0 U	5.0 U
2,4-Dichlorophenol	23	150	µg/l 5.0 U	5.0 U	5.0 U
Phenol	23	40	µg/l 23 U	23 U	23 U
1,2,4-Trichlorobenzene	45	90	µg/l 5.0 U	5.0 U	5.0 U
Hexachlorobenzene	22	40	µg/l 22 U	22 U	22 U
Hexachlorobenzene	—	16.3	lbs/d NA	5.5E-04	7.1E-04
1,2-Dichlorobenzene	40	110	µg/l 5.0 U	5.0 U	5.0 U
1,3-Dichlorobenzene	25	35	µg/l 5.0 U	5.0 U	5.0 U
1,4-Dichlorobenzene	18	45	µg/l 5.0 U	5.0 U	5.0 U
Fluoranthene	—	16	µg/l 10 U	10 U	10 U
Naphthalene	35	105	µg/l 5.0 U	5.0 U	5.0 U
Phenanthrene	35	105	µg/l 5.0 U	5.0 U	5.0 U
Benzene	21	57	µg/l 5.0 U	5.0 U	5.0 U
Chlorobenzene	23	45	µg/l 5.0 U	5.0 U	5.0 U
1,2-Dichloroethane	30	85	µg/l 5.0 U	5.0 U	5.0 U
1,1,1-Trichloroethane	25	65	µg/l 5.0 U	5.0 U	5.0 U
1,1-Dichloroethane	25	65	µg/l 5.0 U	5.0 U	5.0 U
Chloroform	20	40	µg/l 5.0 U	5.0 U	5.0 U
1,2-Dichloroethene (Total)	25	65	µg/l 5.0 U	5.0 U	5.0 U
trans-1,2-Dichloroethene	25	65	µg/l 5.0 U	5.0 U	5.0 U
Ethylbenzene	—	430	µg/l 5.0 U	5.0 U	5.0 U
Toluene	18	35	µg/l 5.0 U	5.0 U	5.0 U
Trichloroethene	25	65	µg/l 5.0 U	5.0 U	5.0 U
Vinyl Chloride	25	65	µg/l 5.0 U	5.0 U	5.0 U
4,4-DDT	—	0.34	µg/l 0.34 U	0.34 U	0.34 U
4,4-DDT	—	0.25	lbs/d NA	8.5E-06	1.1E-05
4,4-DDE	—	14	µg/l 0.35 U	0.35 U	0.35 U
Endosulfan I	32	90	µg/l 0.05 U	0.050 U	0.05 U
2,4-D	1,500	3,300	µg/l 11 U	11 U	11 U
2,4-DB	17	25	µg/l 16 U	16 U	16 U
Dinoseb (DNBP)	420	790	µg/l 1.6 U	1.6 U	1.6 U
Dioxin (2,3,7,8-TCDD)	—	0.000081	µg/l 0.000081 U	0.000081 U	0.000081 U
Dioxin	—	0.00006	lbs/d NA	2.0E-09	2.6E-09
Total Recoverable Antimony	200	305	µg/l 60 U	60 U	60 U
Total Recoverable Arsenic	50	115	µg/l 10 U	10 U	10 U
Total Recoverable Beryllium	—	8.6	µg/l 8.6 U	8.6 U	8.6 U
Total Recoverable Cadmium	—	31	µg/l 31 U	31 U	31 U
Hexavalent Chromium	—	66	µg/l 44 U	44 U	44 U
Trivalent Chromium	—	44	µg/l 10 U	10 U	10 U
Total Recoverable Copper	—	62	µg/l 62 U	62 U	62 U
Total Recoverable Lead	—	18	µg/l 18 U	18 U	18 U
Total Recoverable Mercury	—	3.4	µg/l 3.4 U	3.4 U	3.4 U
Total Recoverable Nickel	—	73	µg/l 73 U	73 U	73 U
Total Recoverable Silver	—	69	µg/l 69 U	69 U	69 U
Total Recoverable Zinc	—	47	µg/l 47 U	47 U	47 U
Total Cyanide	—	78	µg/l 78 U	78 U	78 U

**Notes:**

GPD - Gallons per day

mg/l - Milligrams/liter

µg/l - Micrograms/liter

SJ - Standard units

— - Not applicable

U - Constituent was not detected above the associated detection limit.

UJ - The material was analyzed for, but was not detected. The sample quantitation limit is an estimated quantity.

ULL - The material was analyzed for, but was not detected. The sample quantitation limit is an estimated quantity. Low bias is indicated.

(1) A Monthly Average Flow value is not calculated, value presented is the actual total flow (in gallons) for the month.

Monthly averages are based on 1/2 the detection limit, where applicable.

The mass loadings for hexachlorobenzene, 4,4-DDT, and 2,3,7,8-TCDD (dioxin) were calculated based on 1/2 of the detection limit.